

**ST. CHARLES MUNICIPAL ELECTRIC UTILITY
GUIDE FOR ELECTRIC SERVICE
2004**

This guide is intended to assist new and existing customers by providing the general requirements and standards specified by the St. Charles Municipal Electric Utility for obtaining new or upgraded electric service.

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I. NEC CODE SPECIFICATIONS

The City of St. Charles has adopted the 2002 Edition of the National Electric Code, as modified in Chapter 15.04 “Building Code” of the City of St. Charles Municipal Code.

- A. Amendments to the NEC 2002 specific to St Charles are found in the attached City Ordinance 2003-M-79.

1. Answer to most frequently asked electric code questions.

- A. All services are to be grounded as per the NEC 2002 Section 250. A water service pipe ground and supplemental ground via ground rod(s) or other approved means are required for each service. Building steel is only to be used as a ground if the steel is effectively grounded, as per the NEC 2002.
- B. Services rated above 800A are to follow the NEC 2002 Section 240.4 (C), which states that where the overcurrent device is rated over 800A, the ampacity of conductors it protects shall be equal to or greater than the rating of the overcurrent device. Ampacity is to be based on the lowest temperature rated device that is part of the electric service system.
- C. Dry type distribution transformers are to be grounded as specified in Section 250-30 of the NEC 2002. Dry type transformers are to be considered separately derived AC systems and must be grounded in the same manner as the main building service system.

City of St. Charles, Illinois

Ordinance No. 2003-M-79

**An Ordinance Amending Chapter 15.04 "Building Code"
of the St. Charles Municipal Code (Adoption of the 2002
National Electrical Code NFPA 70)**

**Adopted by the
City Council
of the
City of St. Charles
September 2, 2003**

**Published in pamphlet form by
authority of the City Council
of the City of St. Charles,
Kane and Du Page Counties,
Illinois, September 5, 2003**



City Clerk

(SEAL)

Ordinance No. 2003-M-79

Presented and passed by the
City Council on September 2, 2003

**AN ORDINANCE AMENDING CHAPTER 15.04 "BUILDING CODE"
OF THE ST. CHARLES MUNICIPAL CODE
(Adoption of the 2002 National Electrical Code NFPA 70)**

Whereas, the standard code known as NFPA 70, the National Electrical Code, has been updated by the National Fire Protection Association, Inc.; and

Whereas, the Building and Zoning Commissioner has provided notice to the Illinois Building Commission regarding proposed changes to regulations regarding construction related activities within the City of St. Charles, as provided by 20 ILCS 3918/55; and

Whereas, the City Council finds it to be in the interest of City of St. Charles to periodically update codes regulating buildings and structures.

Now therefore, be it ordained by the City Council of the City of St. Charles, Kane and DuPage Counties, Illinois as follows:

Section 1: That Title 15, "Buildings and Construction", Chapter 15.04 "Building Code" of the St. Charles Municipal Code be and is hereby amended by deleting the provisions of Section 15.04.040 entitled "1996 National Electrical Code -- Regulations adopted and modified" and by substituting the following therefore:

"15.04.040 National Electrical Code 2002 -- Regulations Adopted and modified

The provisions of the 2002 Edition of the National Electrical Code, NFPA 70 issued by the National Fire Protection Association, Inc., One Batterymarch Park, Quincy, Massachusetts, 02269 (hereinafter sometimes referred to as "The NEC") not less than three (3) copies of which have been and are on file in the Office of the Clerk of the City of St. Charles, Illinois for more than thirty days, together with the amendments listed herein, are hereby adopted."

Section 2: That Chapter 15.04 "Building Code" be and is hereby amended by inserting the following Section 15.04.050.

"15.04.050 Amendments to the 2002 National Electric Code NFPA 70:

- A. Amend the provisions of **Section 110.13 (A) "Mounting"** by adding the following paragraph:

All single family dwellings with electric panels to be mounted on concrete or masonry shall have a minimum of half (1/2) inch thick plywood installed behind electric panels, for the purpose of support and to prevent moisture from entering. This shall be mounted in a way that would allow replacement if necessary.

- B. Amend **Section 210.70 "Lighting Outlets Required"** by adding Paragraph (D) **"Illumination of Mechanical Equipment"**:

(D) Illumination of Mechanical Equipment. All single family dwellings shall have luminaries installed within four (4) feet in front of electric panels and heating equipment, in order to service.

- C. 1 Delete the provisions of **Section 230.3 "One Building or Other Structures Not To Be Supplied Through Another"** and substitute the following therefore:

230.3 One Building or Other Structure Not to Be Supplied Through Another. Service conductors, feeders, or branch circuits of one building or other structure shall not pass through the interior of another building or structure.

- 2 Amend **Section 230.6 "Conductors Considered Outside the Building"** by adding Paragraph (5) as follows:

(5) Installed in any "common area" (hallway, corridor, or common space accessible to multiple premises) that meets the construction requirements of a one hour fire rating. Conductors shall be in schedule 40 steel pipe within "common areas." When a "common area" is used for the installation of service conductors external main buildings disconnect shall be required.

3. Delete the provisions of **Section 230.70 "General" (A) Location (1) "Readily Accessible Location"** and substitute the following therefore:

(1) Readily Accessible Location. The service disconnecting means shall be installed at a readily accessible location either outside of the building or structure or inside nearest point of entrance of the service conductors. Within multi-tenant buildings each tenant shall have a single means of de-energizing their main distribution panel from inside their space, unless otherwise approved.

4. Amend the provisions of **Section 230.70 "General"** by adding Paragraph (A) "**Location**" (4) "**Maximum Distance**" as follows:

(4) Maximum Distance. The maximum distance of the service entrance conductors from the metering device to the panel board disconnect shall not exceed five (5) feet in length. Any distance greater than five (5) feet shall have an additional rated disconnect means at the electrical meter for the purpose of over current protection.

5. Amend the provisions of **Section 230.70 "General"** by adding Paragraph (A) "**Location**" (5) "**Multi-tenant Commercial**" as follows:

(5) Multi-tenant Commercial Buildings. Multi-tenant commercial buildings shall have a means to de-energize each service from the outside of the building unless given exemption in writing by the City of St. Charles Municipal Electric Utility.

6. Delete the provisions of **Section 230.79 (C) "One or Two Family Dwelling"** (D) "**All Others**" (E) "**Rating of Service Disconnecting Means**" and substitute the following therefore:

(C) One or Two Family Dwelling. All panel board installations for new single-family detached dwellings shall be a minimum of 200-ampere rated. The main service disconnecting means (circuit breaker or fused switch) shall be 200-ampere rated.

(D) All Others. All panel board installations for new multi-family dwellings and new single-family attached [three (3) units or more] dwelling units shall be a minimum of 100-ampere rated. The main service disconnecting means (circuit breaker or fused switch) shall be a minimum 100-ampere rated.

- (E) For all other installations, the service disconnecting means shall have a rating of not less than 60-ampere, unless approved for special circumstances requiring small disconnects.

7. Amend the provisions of **Section 230.95 "Ground-Fault Protection of Equipment"** and by adding the following paragraph:

Ground-fault protection of equipment, including a remote key operated shunt trip switch, shall be provided for any service 800-ampere or above. The key switch location shall be as determined by the St. Charles Fire Department.

- D. 1. Amend the provisions of Section 300.1 "Scope" (A) "All Wiring Installations" by adding Paragraph (1) as follows:
- (1) With the exception of one and two family dwellings, all current carrying conductors exceeding 50 volts shall be installed in rigid metal conduit, intermediate metallic conduit, electrical metallic tubing, and flexible metallic tubing.
2. Delete the provisions of Section 300.5 "Underground Installations" (D) "Protection from Damage" (3) "Service Conductors" and substitute the following therefore:
- (3) Service Conductors – Customer installed underground service conductors shall be installed in conduit that is encased in concrete unless given exemption by the Director of the City of St. Charles Municipal Electric Utility or his designee.
3. Amend the provisions of Section 300.5 "Underground Installations" by adding to (D) "Protection from Damage" (4) "Enclosure or Raceway Damage" as follows:
- (4) Service wire raceways shall be in concrete encased conduit for multi-family, commercial, and industrial buildings, unless given exemption by the Director of the City of St. Charles Municipal Electric Utility or his designee.
- E. 1. Delete in its entirety Section 314.3 "Nonmetallic Boxes", 314.43 "Nonmetallic Boxes and Conduit Boxes", 314.17 (C) "Nonmetallic Boxes", 334.40 (A) "Boxes of Insulating Material."
- F. 1. Amend the provisions of Section 700.16 "Emergency Illumination" by adding Paragraph (1) as follows:
- (1) Additional spaces that require emergency lighting shall include all restrooms and mechanical rooms.

- G. 1 Amend the provisions of Article 701 "Legally Required Standby System" Section 701.7 "Transfer Equipment Scope" by adding the following paragraph:

(D) Transfer Equipment Requirements: All transfer switch connections shall be "break before make" to insure the complete separation from the utility system and the generator supply. No parallel operation with the utility system shall be allowed. A minimum time delay of three (3) seconds and a maximum of ten (10) seconds after loss of utility power should be established before starting the generator.

2. Amend the provisions of Article 701.11 "Legally Required Standby Systems" by adding Paragraph (G) "Generator Noise Output" as follows:

(G) Generator Noise Output. The maximum noise level allowable within ten (10') feet of transformer, switchgear, or other specified equipment operated by the City of St. Charles Municipal Electric Utility is 80dBA. Sound enclosures or sound barrier walls or other sound mitigation may be required if the noise level near SCMEU equipment exceeds 80dBA. Analysis of the need for sound abatement equipment will be performed by the City of St. Charles Municipal Electric Utility personnel after the generator is installed and tested.

Section 3. That after the adoption and approval hereof this Ordinance shall (a) be printed or published in book or pamphlet form, published by the authority of the City Council, or (b) within thirty (30) days after the adoption and approval hereof, be published in a newspaper published in an with a general circulation within the City of St. Charles; however, this Ordinance shall not become effective before Sept. 2, 2003.

Presented to the City Council of the City of St. Charles, Illinois this 2nd day of Sept., 2003

Passed by the City Council of the City of St. Charles, Illinois this 2nd day of Sept., 2003.

Approved by the Mayor of the City of St. Charles, Illinois this 2nd day of Sept, 2003.

Susan Klinkhara

Mayor

Attest:

Kristie L. Neppen

City Clerk

Council Vote:

Ayes: 10

Nays: 0

Abstain: 0

Absent: 0

Approved as to Form:

Timothy D. O'Neil

City Attorney

Date: September 2, 2003

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SS.

Counties of Kane and DuPage)

Certificate

I, KRISTIE A. NEPHEW, certify that I am the duly elected and acting Municipal Clerk of the City of St. Charles, Kane and DuPage Counties, Illinois.

I further certify that on September 2, 2003, the Corporate Authorities of such municipality passed and approved Ordinance No. 2003-M-79, entitled

"An Ordinance Amending Chapter 15.04 "Building Code" of the St. Charles Municipal Code (Adoption of the 2002 National Electrical Code NFPA 70),"

which provided by its terms that it should be published in pamphlet form.

The pamphlet form of Ordinance No. 2003-M-79, including the Ordinance and a cover sheet thereof was prepared, and a copy of such Ordinance was posted in the municipal building, commencing on September 1, 2003, and continuing for at least ten days thereafter. Copies of such Ordinance were also available for public inspection upon request in the office of the municipal clerk.

DATED at St. Charles, Illinois, this 2nd day of September, 2003.


Municipal Clerk

(S E A L)

II. ELECTRIC CONNECTION FEE ORDINANCE

The St. Charles Municipal Electric Utility requires that the developer/ builder provide the following infrastructure for use by the St. Charles Municipal Electric Utility to provide service to a location.

Brief Description

- A. Concrete Transformer pad – as specified in the City of St. Charles installation requirements for pad mounted transformers.
- B. 4-5” conduit duct package – the developer/builder is responsible for providing 4-5” PVC conduits encased in a 3” envelope of concrete with a minimum cover of 30” to the top of the concrete encased PVC or galvanized rigid metallic conduit. In addition, a 1¼” PVC schedule 40 conduit is to be placed directly above the concrete encased 5” conduits. All 5” conduit bends to be RGS. This duct package will be installed from the concrete transformer pad to the location specified by the St. Charles Municipal Electric Utility project engineer. The construction specifications for this duct package are contained in the city of St. Charles installation requirements for pad mounted transformers.
- C. Ground grid for transformer – as specified in the City of St. Charles installation requirements for pad mounted transformers.

For specific requirements regarding primary service, please refer to the City of St. Charles installation requirements for pad mounted transformers.

Fees for New Services and Service Upgrades

The St. Charles Municipal Electric Utility requires that all on site costs for a new or upgraded service be paid in advance of any work being done on the service. These charges are calculated from a time and material estimate of the work required to complete the new or upgraded service by the St. Charles Municipal Electric Utility crews. All fees for new or upgraded electric services are paid to the City of St. Charles Building and Zoning Department as a portion of the building permit cost.

To request an estimate of the fees involved with a new or upgraded service, the following information is required.

- 1. A site plan showing the electric service location for new services.
- 2. The size in amps of the new or upgraded service.
- 3. The voltage of the new or upgraded service.
- 4. Electric load schedule and riser diagram.

Existing Transformer Upgrade

The customer will pay the exact cost of upgrades to equipment serving the customer facility. A “Transformer Cost Credit” (TCC) will be given for future replacement of existing transformers based on the accumulated depreciation of the existing asset. This is appropriate because the city depreciates major equipment, such as transformers, in order to have replacement funds available when the equipment fails. When equipment is replaced early, at

customer expense, the accumulated funds for replacement will not be needed and are credited to the customer.

The electric utility will determine the expected failure time of the existing transformer based on an expected 30 year life, except regardless of age, all operating equipment is assumed to have a minimum of 5 years life remaining. This number will be used to calculate the credit. The credit will be deducted from the cost of the new transformer only up to the value of the new transformer.

$$\text{TCC} = T (Y/Z)$$
$$\text{Total Upgrade Charge} = N - \text{TCC}$$

Where: TCC = Transformer Cost Credit

T = Cost of the existing transformer (material and labor in today dollars)

Y = Years of life used (minimum 30)

Z = Total expected life (assumed 35 years)

N = The total cost proposed new transformer (in today dollars)

Below is an example of the TCC on a \$20,000 transformer at selected years used:

| | |
|------------------|-------------|
| 5 years used | \$2,857.14 |
| 10 years used | \$5,714.28 |
| 15 years used | \$8,571.43 |
| 20 years used | \$11,428.57 |
| 25 years used | \$14,285.71 |
| 30 years used | \$17,142.86 |
| 35 years or more | \$17,142.86 |

To request an estimate of the fees for a new or upgraded service, please contact the St. Charles Electric Utility at (630) 377-4407.

For specific requirements regarding fees for primary service, please refer to the City of St. Charles Ordinance No. 1994-M-65.

CITY OF ST. CHARLES

ORDINANCE NO. 1994-M-65

AN ORDINANCE AMENDING TITLE 13, "PUBLIC UTILITIES"
CHAPTER 13.08, "ELECTRICITY"

ADOPTED BY THE

CITY COUNCIL

OF THE

CITY OF ST. CHARLES

THIS 3RD DAY OF OCTOBER, 1994

PUBLISHED IN PAMPHLET FORM BY
AUTHORITY OF THE CITY COUNCIL
OF THE CITY OF ST. CHARLES,
KANE AND DU PAGE COUNTIES,
ILLINOIS, THIS 7TH DAY OF
OCTOBER, 1994

Jean M. Connor
CITY CLERK

(S E A L)

DATE OF 10/7/94
10/3/94
ORDINANCE NO. 1994-M- 65

AN ORDINANCE AMENDING TITLE 13, "PUBLIC UTILITIES"
CHAPTER 13.08, "ELECTRICITY"

BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF ST. CHARLES, KANE
AND DU PAGE COUNTIES, ILLINOIS, AS FOLLOWS:

1. That Title 13, "Public Utilities", Chapter 13.08, "Electricity", Sections 13.08.010, 13.08.020, 13.08.150 and 13.08.300 of the St. Charles Municipal Code, be and are hereby amended by deleting the same and substituting and adding the following therefor; and Section 13.08.160 is added hereby as follows:

13.08.010 ELECTRIC DEPARTMENT - ESTABLISHED - PURPOSE

The City of St. Charles Electric Utility (SCMEU) shall be responsible for: generation and/or purchase, distribution and sale of electrical energy to its Customers.

13.08.020 ELECTRICAL DEPARTMENT - DIRECTOR DESIGNATED

The director of electricity shall have supervision over the operation, maintenance and repair of the city's electrical distribution system.

13.08.150 GENERAL TERMS AND CONDITIONS

GENERAL SERVICE AND MULTI-UNIT RESIDENTIAL INSTALLATIONS (e.g., APARTMENTS, CONDOMINIUMS)

A. CUSTOMER, as prescribed by: the 1993 edition NATIONAL ELECTRIC CODE, NFPA No. 70-1987 adopted by the National Fire Protection Association, the NATIONAL ELECTRIC SAFETY CODE, 1984 Edition (ANSI C2-1984), RULES AND REGULATIONS of SCMEU, and directives of the Director of SCMEU, shall furnish, install & maintain:

- 1.- Foundation and pad for transformers
- 2.- Primary line conduit to the PRIMARY VOLTAGE POINT OF CONNECTION (PVPC)
- 3.- Ground grid as required

- 4.- Entrance service
 - 5.- Secondary line conduit & secondary conductors
 - 6.- Vehicle barriers as required
- B. SCMEU, upon receipt of a specified SERVICE ORIENTATION CONNECTION CHARGE (SOCC), will furnish, install, & maintain;
- 1.- Transformer(s), switch gear, circuit protection, ground connections for primary and secondary compartments
 - 2.- Primary cables and connections
 - 3.- Make secondary line connections at transformer and at the entrance service

13.08.160 STREET LIGHTING AND MISCELLANEOUS SERVICES

Street lighting capital, maintenance, and retirement work, and miscellaneous services, all as requested of SCMEU, will be billed at SCMEU's incurred cost for materials, labor, equipment charges, and all related overhead charges.

13.08.300 TEMPORARY CUSTOMER CONNECTION (TCC)

- A. A TEMPORARY CUSTOMER CONNECTION, as defined Section 13.08.015 (L) will be provided for a CUSTOMER upon application and payment of a TEMPORARY CUSTOMER CONNECTION CHARGE (TCCC) as established by SCMEU on a case by case, IN PLACE COST basis.
- B. TEMPORARY CUSTOMER CONNECTIONS for casual uses shall be limited to a maximum of twenty-one (21) days each calendar year for any event, function, or property.

2. That after the adoption and approval hereof the Ordinance shall (i) be printed or published in book or pamphlet form, published by the authority of the Council, or (ii) within thirty (30) days after the adoption and approval hereof, be published in a newspaper published in and with a general circulation within the City of St. Charles.

PRESENTED to the City Council of the City of St. Charles, Illinois, this 3rd day of October, 1994.

PASSED by the City Council of the City of St. Charles, Illinois, this 3rd day of October, 1994.

III. SECONDARY SERVICE

The St. Charles Municipal Electric Utility requires that the developer/builder provide the following infrastructure for secondary service to a building or tenant space.

- A. Conduit – the conduit between the transformer location and the service entrance location are to be provided and installed by the developer. All conduit installations must conform with the NEC 2002 as adopted by the City of St. Charles, see Section 1.
- B. Service entrance conductors – The conductors intended to feed the main service between the transformers location and the service entrance location are to be provided and installed by the developer. All service entrance conductors shall be sized and installed in accordance with the NEC 2002 as adopted by the City of St. Charles, see Section 1.
- C. All secondary service conductors, including but not limited to feeders and branch circuits that supply electric power to individual units in a multi-unit building, shall be installed outside the building or within the concrete floor, wall or other encasement protected with a minimum of 2” of concrete or brick from the service entrance to the panel containing the disconnect for each individual unit.

These installations must conform with the NEC as adopted by the City of St. Charles, reference NEC 230.3, NEC 230.6 and Ordinance No. 2003-M- 79 Section 2C.

- D. All electric meters shall be located outside of the building.

Please refer to Section #1, of this guide NEC code specification, for answers to code questions regarding conduit and conductor sizes.

IV. CITY OF ST. CHARLES INSTALLATION REQUIREMENTS FOR PAD MOUNTED TRANSFORMERS AND TRANSFORMER PADS

1. SCOPE

The information in this specification covers general conditions and requirements for the installation of single phase and three phase pad mounted transformers.

2. GENERAL

The service facilities furnished and installed by the Customer and the City shall be in accordance with the City's specifications and the requirements herein, in addition to a service entrance location sketch.

The size and location of the underground primary service connection and transformer pad on the Customer's property will be furnished by the City on a separate sketch.

3. CITY WILL FURNISH, INSTALL, OWN AND MAINTAIN

- (A) Pad mounted transformer, appropriate electrical protective equipment, ground connections for primary and secondary compartments, lugs for terminating primary and secondary cable at transformer and electric meters.
- (B) Primary service connection cables for the entire service connection.
- (C) The City shall have continued access to the installations, without impediments from over-building or obstructions for operation and maintenance of cable and transformers.

4. CITY WILL CONNECT

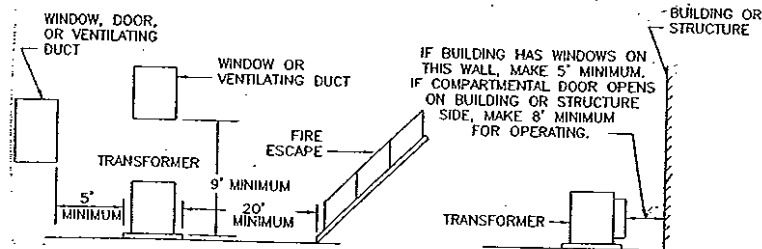
The primary and secondary service connection cables and ground connections to the pad mounted transformer terminals.

5. CUSTOMER SHALL FURNISH, INSTALL, OWN AND MAINTAIN

Foundation for pad mounted transformer (formed and poured in the field or preformed), ground grid (ground rods, conductor and approved connectors), secondary cables, the conduit and trench for the primary and secondary cables and the CT cabinet and meter enclosure or pedestal per City's specifications. Please note all electric meters provided by the City shall be installed on the outside of the building.

The foundation shall be located as far as practical from windows, doors, fire escapes, entrances and ventilating ducts so as not to present a physical obstruction. It shall be

the customer's responsibility to comply with any insurance regulations affecting the installation. The following are recommended minimum clearance between the transformers foundation and windows, doors, fire escapes etc.



A barrier shall be installed where damage to the transformer by vehicles is possible. Barrier must be installed before transformer is set. City will furnish specifications.

Conduit run for primary service connection cable on private property:

Single Phase Transformer:

Conduit run shall consist of 2-3" and 1-1 1/4" conduits originating from two points on customer's property line, designated by the City to the transformer foundation, terminating with 3" 90 degree 12 inch minimum radius, galvanized rigid steel bends provided with ground clamps for #2 wire, O.Z. type "BLG" or equivalent, termination flush with the top of the foundation. Foundation shall not be poured around conduit bends. Loop feeds may be required depending on the arrangement of the electrical facilities

Three Phase Transformer:

The conduit run shall consist of 2-5" conduits and 1- 1 1/4" originating from two points on customer's property line, designated by the City to the transformer foundation, terminating with 5 inch 90 degree 24 inch minimum radius, galvanized rigid steel bends provided with ground clamps for # 2 wire, O.Z. type "BLG" or equivalent, terminating flush with top of the foundation. The 1 1/4" PVC conduit shall be terminated with a 90 degree PVC elbow next to the transformer pad as shown on the following pages. It can rest on top of concrete encasement. Foundation shall not be poured around conduit bends. Loop feed is mandatory for all three phase transformers. For specific size of transformer pad contact the City's Electric Office.

TYPES OF APPROVED CONDUIT RUNS

| <u>Conduit</u> | <u>Separation Between Conduits</u> | <u>Minimum Depth to Concrete Envelope* from Final Grade</u> | <u>Minimum Depth to Conduit Without Concrete Envelope</u> |
|------------------|--|---|---|
| Hot Galvanized | 2 inch | N/A | 30 inches |
| Rigid Steel | | | |
| Approved Plastic | 2 inch | 30 inch | N/A |

* Concrete Envelope to be 3" thick.
Spacers to be placed no more than 48" apart.

Service conductors supplying a building, structure or tenant shall NOT pass through the interior space of another building, structure or tenant. Service conductors can be

installed along the “exterior” of one building or tenant to supply another building or tenant. Service conductors will be considered “exterior” where installed under not less than 2” of concrete beneath the building or in a raceway that is encased in concrete or brick not less than 2” thick.

Conduit passing through a building shall be hot galvanized rigid steel encased in 2” concrete envelope and be provided with a watertight seal between conduit and building wall. Curves and bends in the conduit run shall be avoided wherever possible. Where a run contains curves in any plan or if a straight run exceeds 560 feet in length, the City shall be consulted as to permissible maximum length and radii of curvature. Manholes, built to the City’s specifications, will be required where total distance exceeds permissible conduit run lengths.

The entire conduit run shall be installed on undisturbed or well-tamped earth. Conduit shall slope a minimum of 1 inch per 100 feet and may drain either way or in both directions to manhole or drainage pit. After installation, conduit shall be checked with a mandrel designed for the conduit and a ¼ inch polyethylene rope or equivalent left in designated duct. City inspector to check installation of conduit before trench is backfilled. Ends of conduit are to be temporarily sealed.

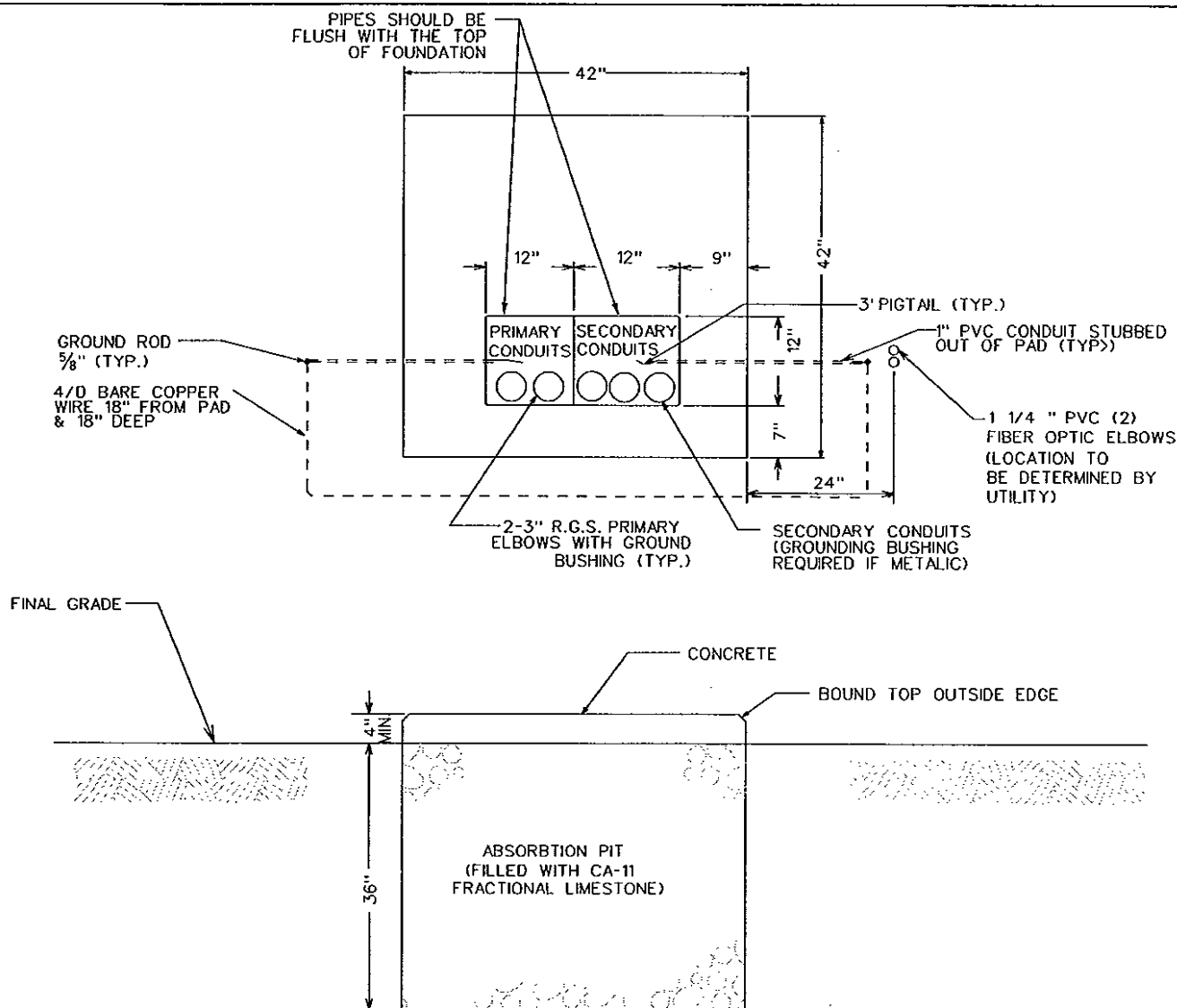
Conduit bend at transformer foundation for primary service connection shall be galvanized rigid steel conduit, with acceptable ground clamps for #2 wire, O.Z. type “BLG” or equivalent.

Underground Secondary Service Connection.

The Underground Service Connection shall consist of cable and conduit. The bends and stub-ups shall be hot galvanized rigid steel conduit and shall terminate either flush with the top of the foundation or extend a maximum of 2”-3” above the foundation. Provide metal conduit ground clamps for #2 wire, O.Z. type “BLG” or equivalent. Without exception, customer’s service neutral shall be connected to the neutral secondary of the pad mounted transformer. Foundation shall not be poured around bends. If meter location is a significant distance from transformer, install an additional 1 ¼” PVC conduit between the transformer and the metering area.

Transportation of Transformers.

Where a pad mounted transformer is accessible to the City’s truck, transformers will be transported to the station location. **Where such station is not accessible, any additional moving expense, which may be necessary to place transformers in position for installation, will be the customer’s responsibility.**

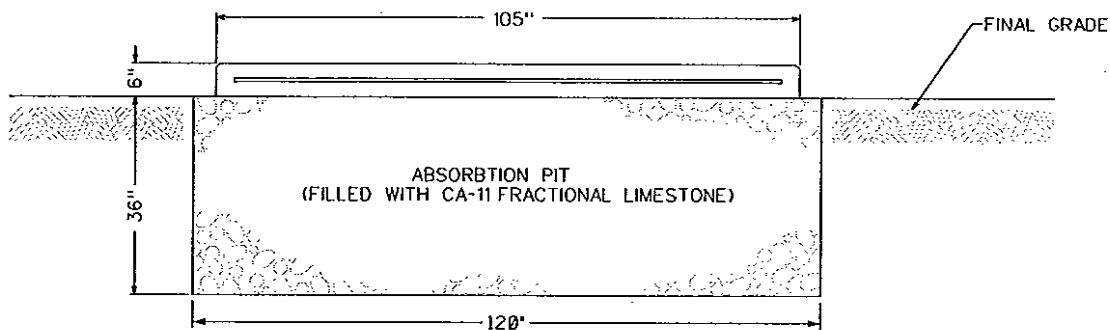
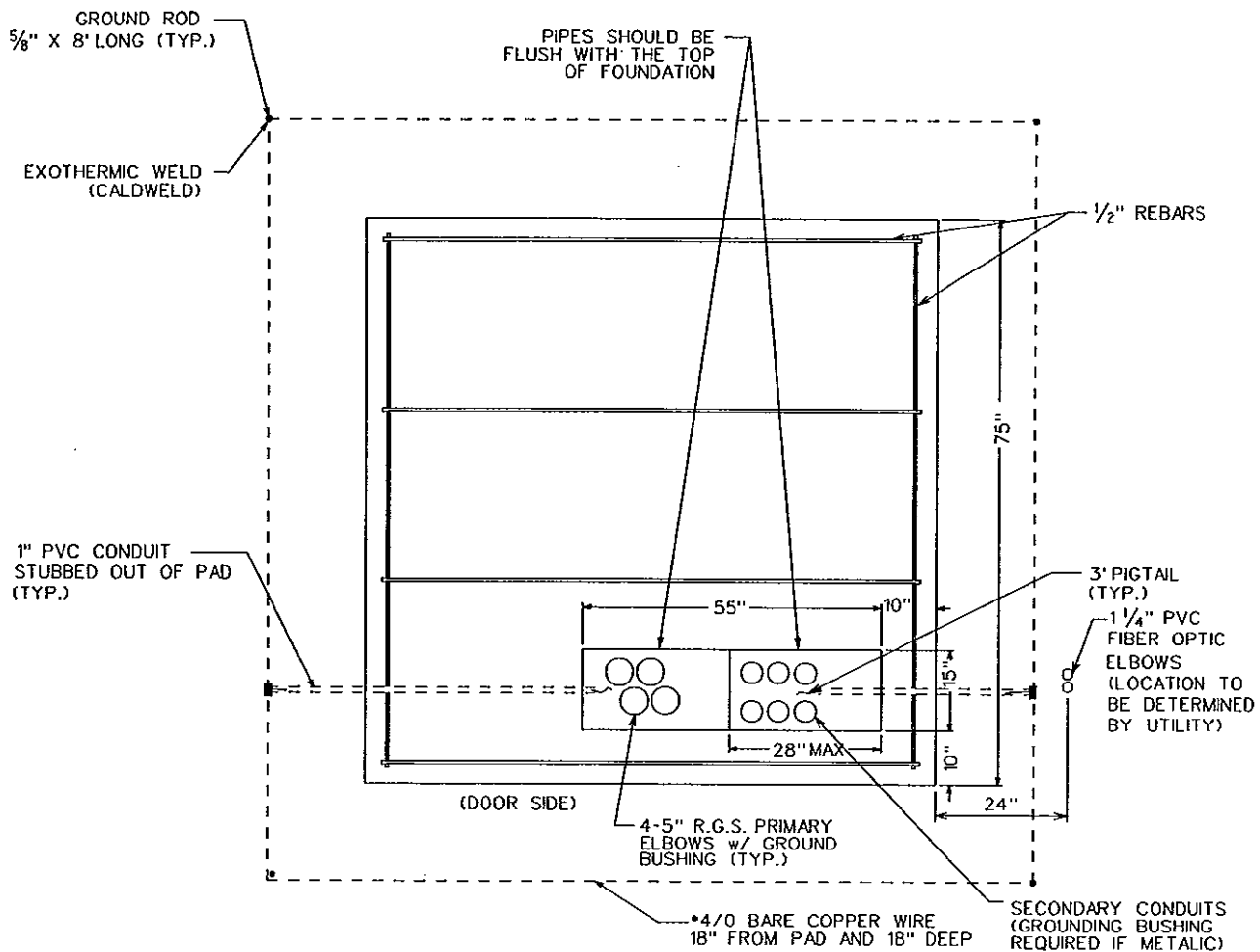


NOTE: IN MULTI-FAMILY (APARTMENTS, CONDO, ETC.) DEVELOPMENTS AND IN RESIDENTIAL DEVELOPMENTS WHERE THE TRANSFORMER HAS TO BE PLACED CLOSE TO THE BUILDING BECAUSE OF LOT SIZE, HEAVY ELECTRICAL USE OR ANY OTHER CONVENIENCE THE PROPERTY OWNER WILL INSTALL THE TRANSFORMER PAD AND CONDUITS PER CITY INSTALLATION REQUIREMENTS

1 PHASE TRANSFORMER PAD

ST. CHARLES MUNICIPAL ELECTRIC

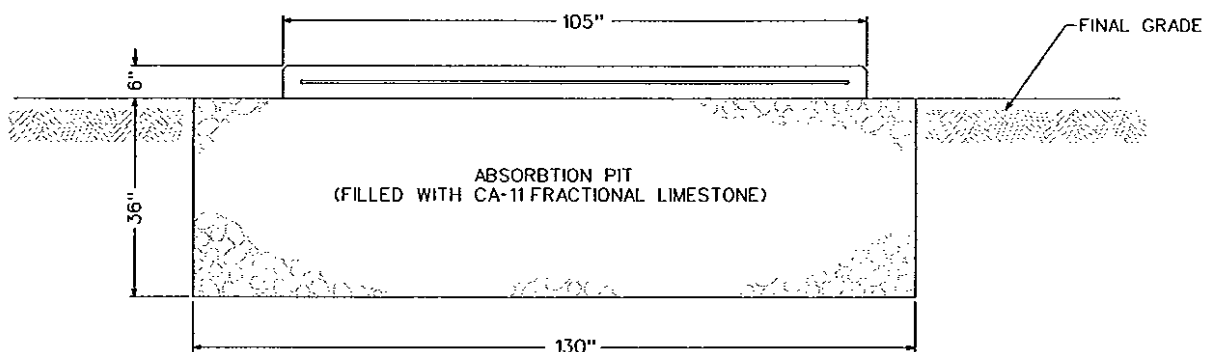
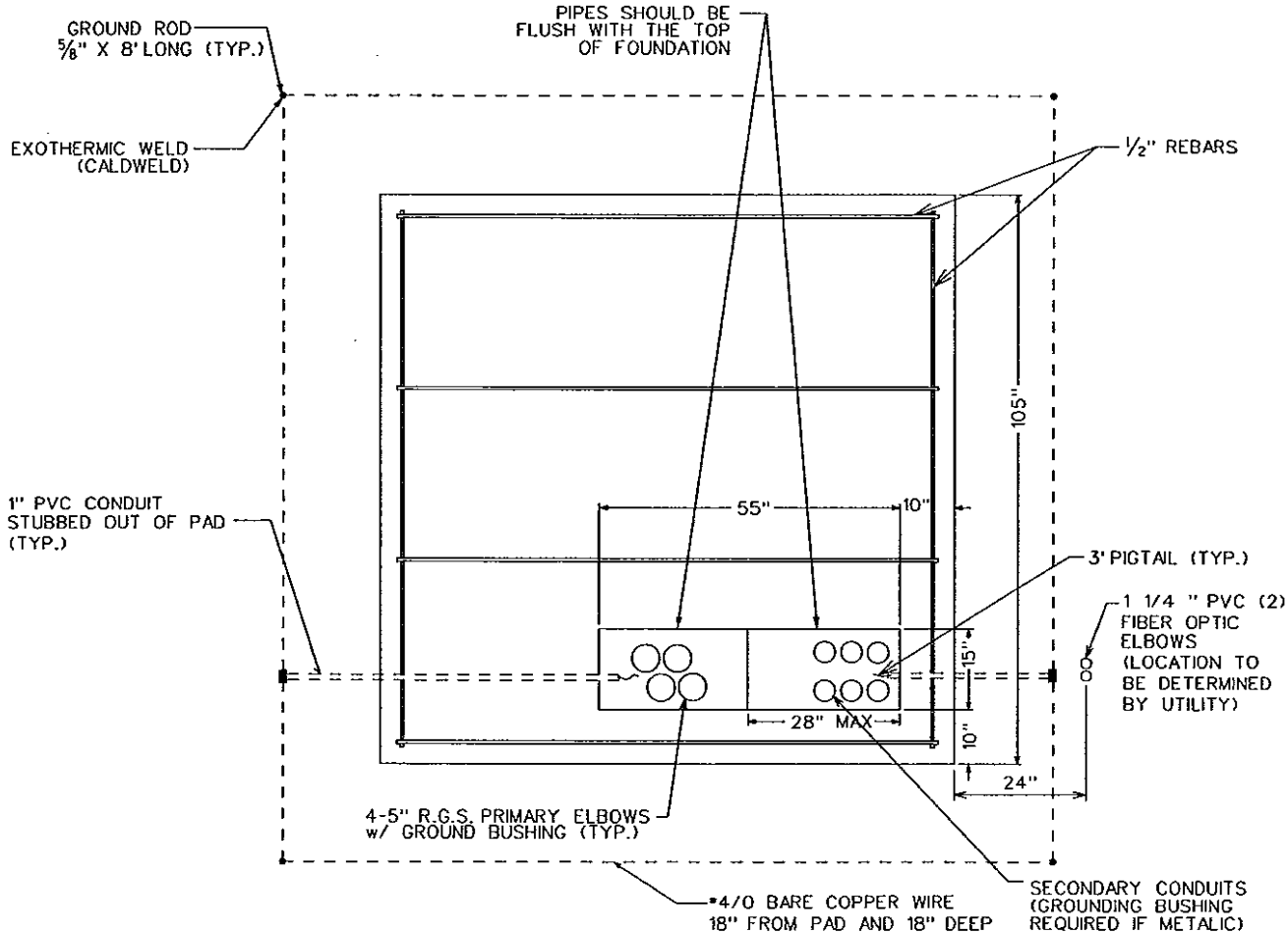
| NO. | DATE | TYPE | BY |
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| 8 | 1/12/04 | REVISED | PWS |
| 7 | 09/26/03 | REVISED | PWS |
| 6 | 08/29/02 | REVISED | PWS |
| 5 | 03/25/02 | REVISED | PWS |
| 4 | 10/10/01 | REVISED | PWS |
| 3 | 06/22/00 | REVISED | PWS |
| 2 | 12/17/97 | REVISED | PNB |
| 1 | 7/19/90 | REVISED | |



3 PHASE TRANSFORMER PAD
75 KVA TO AND INCLUDING 750 KVA

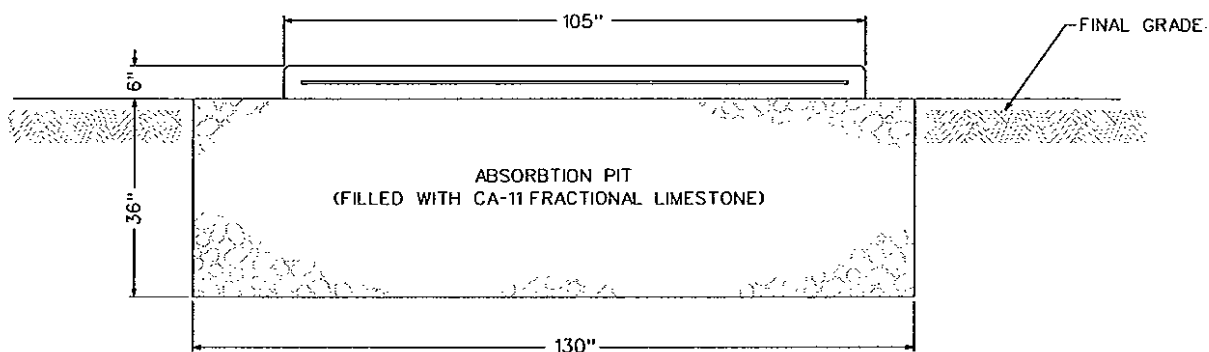
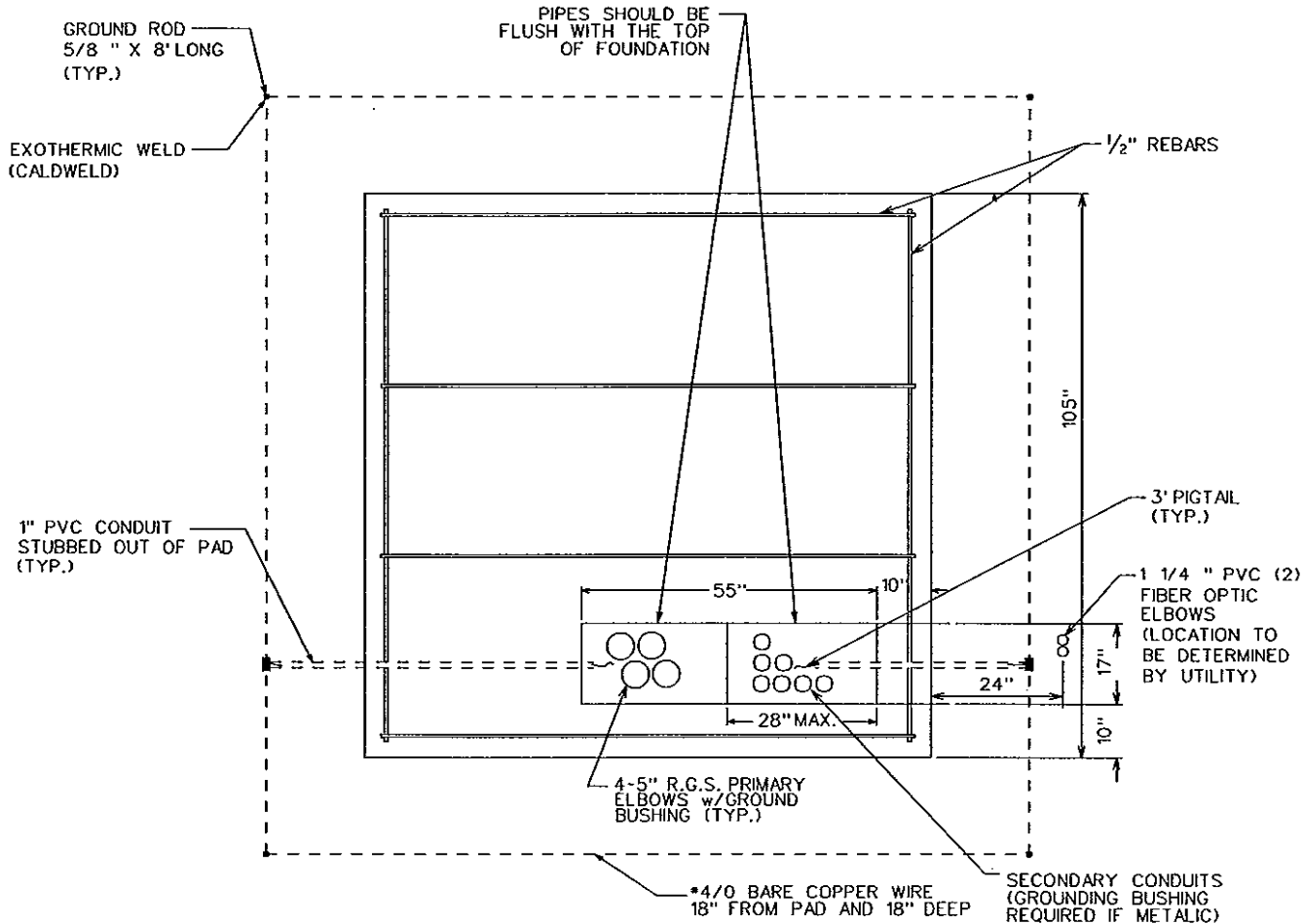
ST.CHARLES MUNICIPAL ELECTRIC

| NO. | DATE | TYPE | BY |
|-----|----------|---------|-----|
| 7 | 1/12/04 | REVISED | PWS |
| 6 | 03/25/03 | REVISED | PWS |
| 5 | 08/29/02 | REVISED | PWS |
| 4 | 10/10/01 | REVISED | PWS |
| 3 | 08/31/00 | REVISED | PWS |
| 2 | 06/22/00 | REVISED | PWS |
| 1 | 12/17/97 | REVISED | PNB |



3 PHASE TRANSFORMER PAD
OVER 750 KVA TO AND INCLUDING 2000 KVA
ST.CHARLES MUNICIPAL ELECTRIC

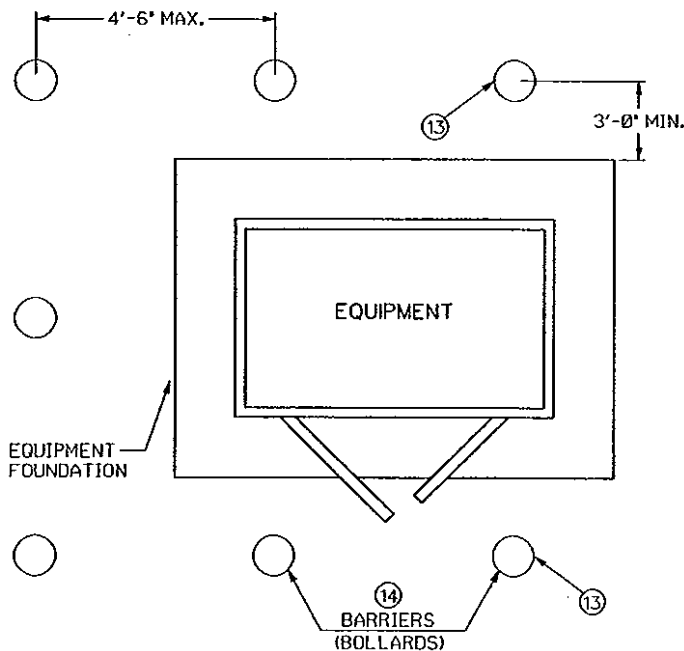
| NO. | DATE | TYPE | BY |
|-----|----------|---------|-----|
| 8 | 1/12/04 | REVISED | PWS |
| 7 | 11/03/03 | REVISED | PWS |
| 6 | 03/25/03 | REVISED | PWS |
| 5 | 08/29/02 | REVISED | PWS |
| 4 | 10/10/01 | REVISED | PWS |
| 3 | 08/31/00 | REVISED | PWS |
| 2 | 06/22/00 | REVISED | PWS |
| 1 | 12/17/97 | REVISED | PNB |



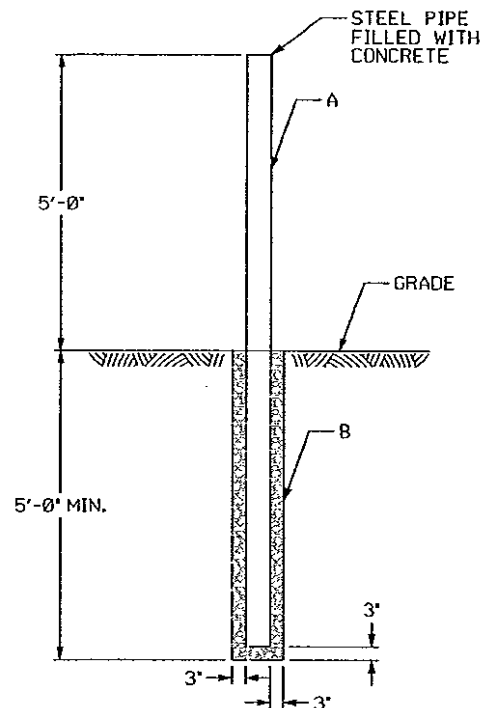
3 PHASE TRANSFORMER PAD
2500 KVA AND LARGER

ST.CHARLES MUNICIPAL ELECTRIC

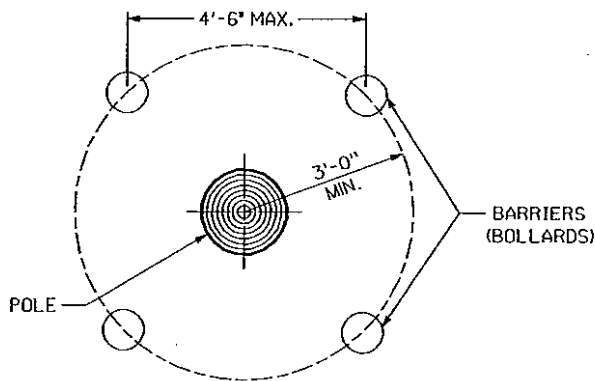
| NO. | DATE | TYPE | BY |
|-----|----------|---------|-----|
| 7 | 1/12/04 | REVISED | PWS |
| 6 | 03/25/03 | REVISED | PWS |
| 5 | 08/29/02 | REVISED | PWS |
| 4 | 10/10/01 | REVISED | PWS |
| 3 | 08/31/00 | REVISED | PWS |
| 2 | 06/22/00 | REVISED | PWS |
| 1 | 12/17/97 | REVISED | PNB |



PLAN FOR FOUNDATION



BARRIER DETAIL



PLAN FOR POLE

NOTES:

- (11) THIS BARRIER SHALL BE USED WHERE DAMAGE TO ELECTRICAL FACILITIES FROM VEHICULAR TRAFFIC IS PROBABLE OR AS REQUIRED BY THE CITY ELECTRICAL ENGINEERING OFFICE. (EQUIPMENT MOST SUSCEPTABLE ARE TRANSFORMERS, SWITCHGEAR, AND POLES)
- (12) OTHER TYPES OF BARRIERS SUCH AS RAILROAD RAILS MAY BE USED UPON APPROVAL.
- (13) PROVIDE ADEQUATE CLEARANCE FOR ITEMS SUCH AS TRANSFORMER COOLING COILS AND OPENED DOORS ON EQUIPMENT. EXACT LOCATION OF BARRIERS TO BE DETERMINED BY THE ELECTRICAL ENGINEERING OFFICE.
- (14) WHEN OVERHEAD OBSTACLES PREVENT REMOVAL OF EQUIPMENT BY CRANE, ONE OF THE BARRIERS MUST BE MADE REMOVABLE.

| ITEM | MATERIAL DESCRIPTION |
|------|-------------------------------------|
| A | CONDUIT, RIGID, STEEL, 5 IN. I.P.S. |
| B | MIXTURE, CONCRETE, 90 LBS. |

VEHICULAR BARRIER ST.CHARLES MUNICIPAL ELECTRIC

| NO. | DATE | TYPE | BY |
|-----|----------|---------|-----|
| 5 | 08/29/02 | REVISED | PWS |
| 4 | 10/10/01 | REVISED | PWS |
| 3 | 1/30/01 | REVISED | PWS |
| 2 | 7/19/90 | REVISED | PNB |
| 1 | 9/20/90 | REVISED | PNB |

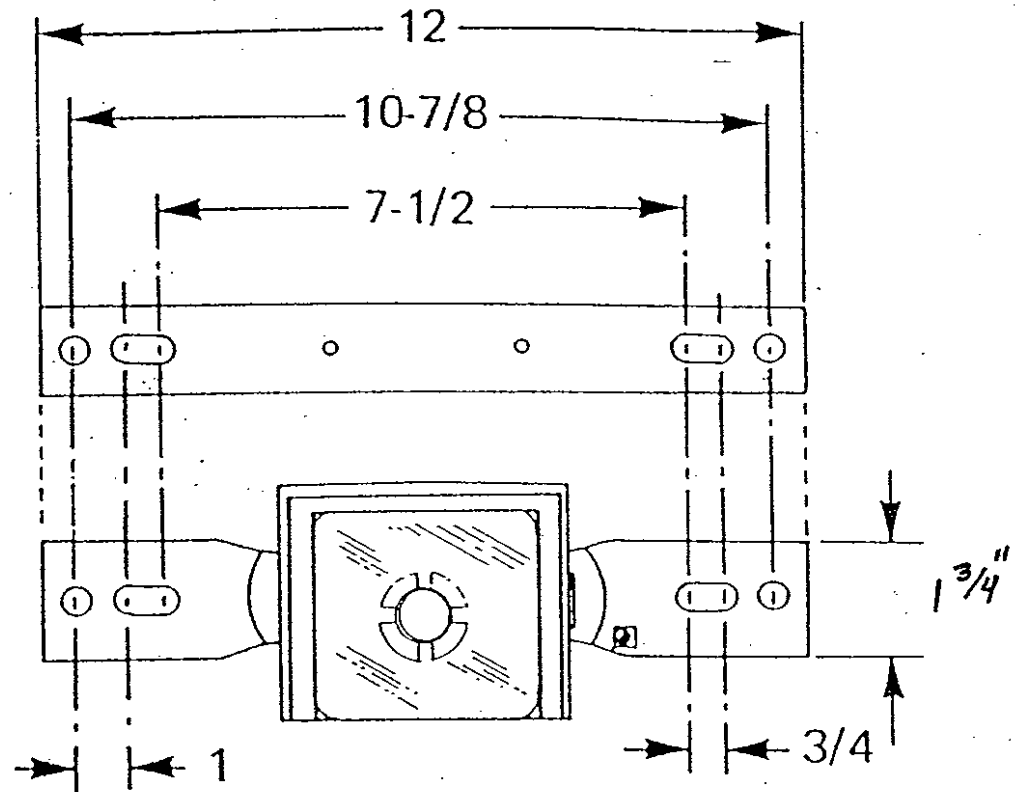
V. CURRENT TRANSFORMERS

The St. Charles Electric Utility provides and installs the current transformers necessary for metering three phase services 400A and larger. The dimensions for the specific current transformers and the service sizes they pertain to are on the following pages. The wiring necessary between the current transformers and the meter socket must be supplied by the developer/builder and is specified below. Please submit the appropriate current transformer detail and wiring schedule to the panel manufacturer to ensure that the equipment will conform to the St. Charles Electric Utility standard.

The following are the Current Transformer Wiring Specifications:

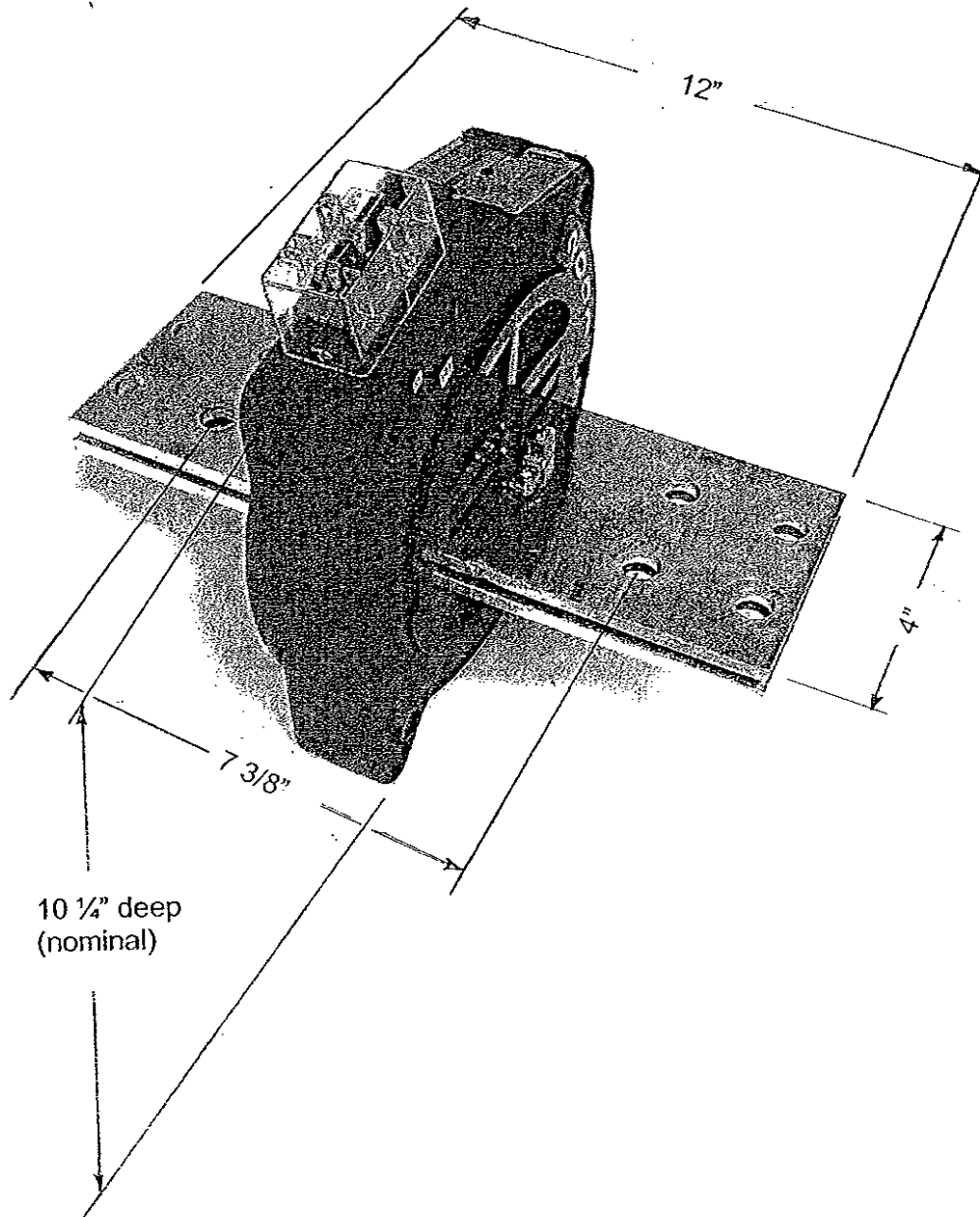
| <u>WIRE COLOR</u> | <u>WIRE SIZE</u> |
|-------------------|---------------------|
| RED | 1 - #10 and 1 - #14 |
| BLUE | 1 - #10 and 1 - #14 |
| BLACK | 1 - #10 and 1 - #14 |
| WHITE | 1 - #10 and 1 - #14 |
| GREEN | 1 - #12 |

APPENDIX A
SERVICE SIZE TO 1600 AMP



ITEM V

ST. CHARLES MUNICIPAL ELECTRIC UTILITY
CURRENT TRANSFORMER FOR SERVICES 2000AMPS AND ABOVE



VI. REQUIRES INSPECTIONS

The St. Charles Municipal Electric Utility requires the following inspections for new and upgraded service installations.

The following service inspections are to be scheduled through the Electric Utility, and a minimum of 24 hours is required for scheduling an inspection.

A. Primary Service

1. Conduit in trench prior to concrete encasement.
2. Concrete encasement prior to backfilling trench.
3. Transformer pad absorption pit prior to stone backfill.
4. Transformer pad form dimensions prior to concrete pour.
5. Ground grid conductor and cadwells (AMP wedge connectors are an acceptable alternative) prior to backfill.
6. Vehicle Barrier Locations – if required.

B. Secondary Service

1. Conduits must be inspected prior to backfill.
2. Main service inspection of switchgear, grounding and current transformer cabinet or meter socket.

All of the above installations must be inspected and approved by the Electric Utility Project Engineer or Operating Foreman prior to scheduling service to be energized. Any and all reinspections must comply with 24-hour notice limitation for scheduling inspections.

To schedule inspections, please call the St. Charles Municipal Electric Utility at (630) 377-4407.

VII. APPLICATION FOR SERVICE

An electric service application must be completed and submitted to the City of St. Charles Building and Zoning Department for each service requested. This includes one application for permanent service, one application for temporary service, and one application for a fire service (if applicable).

ORIGINAL SIGNED APPLICATIONS WILL BE ACCEPTED ONLY, NO FACSIMILE COPIES.

City of St. Charles
Municipal Electric Office
Two East Main Street – St. Charles IL 60174
630/377-4407



Electric Service Application – New Service/Upgrade
(Each individual service will require a complete and separate application)

Name: _____ Phone: _____
Original Signature: _____ Fax: _____
Contact Name: _____ Phone: _____
Application Date: _____ Requested Service Date: _____

| Existing Building | Other | New Building | |
|---|--|---|---|
| <input type="checkbox"/> Residential | <input type="checkbox"/> Temp Connection | <input type="checkbox"/> Residential: Single family | <input type="checkbox"/> Single Phase 120/240 |
| <input type="checkbox"/> Commercial | <input type="checkbox"/> Street Lights | <input type="checkbox"/> Residential: Multi Family | <input type="checkbox"/> Three Phase |
| <input type="checkbox"/> Industrial | <input type="checkbox"/> Traffic Signals | <input type="checkbox"/> estimated # of units _____ | <input type="checkbox"/> 120/208 |
| <input type="checkbox"/> Upgrade Service | <input type="checkbox"/> New Service | <input type="checkbox"/> Commercial | <input type="checkbox"/> 277/480 |
| <input type="checkbox"/> Relocate Service | <input type="checkbox"/> Relocate | <input type="checkbox"/> Commercial: Multi Family | <input type="checkbox"/> Other |
| <input type="checkbox"/> Convert OH to UG | <input type="checkbox"/> Antenna Site | <input type="checkbox"/> estimated # of units _____ | |
| | <input type="checkbox"/> Signage Lights | <input type="checkbox"/> Industrial | |
| | | <input type="checkbox"/> Other | |

Service Panel: _____
Present Rating (amps) _____ Proposed rating (amps) _____ Proposed Connected KW: _____
Present Peak KW (Demand) _____ Estimated Peak KW (Demand) _____

SERVICE ADDRESS

(A complete and accurate service address is required before service may be installed)

Street Address: _____
Subdivision: _____ Lot # _____ Real Estate Permanent Tax # _____
Legal Description (attach sheet if necessary): _____
Record Titleholder of property: _____
If property is held in trust, identify beneficial owner (s): _____
Address: _____

CUSTOMER BILLING INFORMATION

(This information will be used for utility billing purposes)

Name: _____
Street Address: _____
City/State/Zip _____ Phone: _____
Authorized representative or agent: _____
Title: _____ Phone: _____

BUILDING DIVISION OFFICE USE

Application Accepted By: _____

Date Application Received: _____

Date Payment Received: _____

Method of Payment: _____

Building Permit No.: _____

ELECTRIC DEPARTMENT CHARGES

Charges Calculated by: _____

Date: _____

| <u>ITEM</u> | <u>ACCOUNT #</u> | <u>CHARGES (\$)</u> | <u>AMOUNT PAID</u> |
|----------------------------------|------------------|---------------------|--------------------|
| Project Cost: | 343-15 | _____ | _____ |
| SOCC - VACANT | 323-10 | _____ | _____ |
| SECC: VACANT | 323-11 | _____ | _____ |
| SOCC: | 323-12 | _____ | N/A |
| SECC: | 323-13 | _____ | _____ |
| Upgrade Charges: | 323-14 | _____ | _____ |
| Engineering: | 341-11 | _____ | _____ |
| Temp Connection: | 343-18 | _____ | _____ |
| Electric Improvement: | 343-14 | _____ | _____ |
| Relocation | _____ | _____ | _____ |
| Subtotal | | _____ | N/A |
| Less contribution- if applicable | | _____ | _____ |
| Total Amount of Charges: | | _____ | _____ |

2003 Rates – City Code 13.08.220 thru 13.08.305

13.08.220 Rates - Established.

The rates for the purchase of electrical energy are established as set out in Sections 13.08.230 through 13.08.290. (Ord. 1996-M-77 § 1; Ord. 1995-M-23 § 1; Prior code 14.104 (part).)

13.08.230 Rate 1 - Residential - Rates, Charges and Service Requirements.

A. Availability. Electrical energy is available under this rate for residential purposes.

B. Charges for this rate shall be as follows:

1. Monthly Customer Charge. The net monthly customer charge shall be four dollars and forty-five cents (\$4.45) per meter.

2. Energy Charge. The net energy charge shall be as follows:

| Summer Months | Kilowatt hours |
|--|----------------|
| \$.084 per kilowatt-hour for the first | 1000 |
| \$.101 per kilowatt-hour all over | 1000 |
| | |
| Non-summer Months | Kilowatt hours |
| \$.061 per kilowatt-hour for the first | 500 |
| \$.034 per kilowatt-hour for all over | 500 |

For the purposes hereof the "summer months" shall be the customer's first monthly billing period with an ending meter reading date on or after June 15 and the three succeeding monthly billing periods.

3. Minimum Charge. The minimum net monthly charge shall be the net monthly customer charge.

4. Gross Charge. The gross charge shall be ten percent more than the sum of the net monthly customer charge and the net energy charge for the billing period.

C. General Requirements.

1. The customer's wiring shall be so arranged that all service hereunder may be supplied through a single metering installation.

2. Service hereunder will be furnished only to a single occupancy, and where service to an apartment building is desired hereunder, each apartment shall be treated as a separate customer and served through a separate metering installation; provided, however, that in apartment buildings containing six or fewer apartments, hall lights and building operating equipment, including no motors larger than one horsepower and not more than six horsepower for all motors, may be connected to the metering installations for one of the apartments, or as a separate metering installation at the discretion of the building operator. The meters shall be grouped in a single location.

3. The terms and conditions stated in Sections 13.08.010 through 13.08.210 apply to this rate and service hereunder shall be subject thereto.

(Ord. 2002-M-29 § 1; Ord. 2001-M-30 § 1; Ord. 2000-M-69 § 1; Ord. 1996-M-77 § 1; Ord. 1995-M-41 § 1; Ord. 1995-M-23 § 1; Ord. 1991-M-19 § 1; Ord. 1990-M-46 § 1; Ord. 1989-M-56 § 1; 1988-M-20 § 1; Ord. 1986-M-82 § 1; Ord. 1983-M-48 § 1 (part); Ord. 1982-M-15 § 1 (part); Ord. 1979-M-31 § 1 (part); Ord. 1977-M-40 § 1 (part); Ord. 1977-M-14 (part); Ord. 1975-M-38 (part); Ord. 1975-M-25 (part); Ord. 1974-M-23 § 1; Ord. 1965-48 § 1 (part); prior code 14.104(A).)

13.08.240 Rate 3 – Small General Service – Rates, Charges, and Service Requirements.

A. Availability.

1. Electrical energy is available under the Small General Service rate to any customer using the City's electric system for all requirements other than residential service where such customer has a monthly peak kilowatt demand of less than or equal to 25 kilowatts during the previous eighteen billing periods and no more than one billing period where the kilowatt-hour usage is greater than 2000 kilowatt-hours within six successive billing cycles during the previous eighteen months. Any customer whose monthly peak demand has exceeded 25 kilowatts in the previous eighteen billing periods or has exceeded one billing of more than 2000 kilowatt-hours during six successive billing periods in the previous eighteen billing periods will be billed at the rate described in Section 13.08.260.

B. Charges for this rate shall be as follows:

1. Monthly Customer Charge. The net monthly customer charge shall be seven dollars and eighty cents (\$7.80) per meter.

2. Energy Charge. The net energy charge shall be as follows:

\$.094 per kilowatt-hour - Summer Months

\$.066 per kilowatt-hour - Non-Summer Months

For purposes hereof, the "summer months" shall be the customer's first monthly billing period with an ending meter reading date on or after June 15 and the three succeeding monthly billing periods.

3. Minimum Charge. The net minimum monthly charge shall be the net monthly customer charge.

4. Gross Charge. The gross charge shall be ten percent more than the sum of the net customer charge and net energy charge.

C. General Requirements:

1. The customer's wiring shall be so arranged that all service hereunder may be supplied through a single metering installation adequate for a normal load equal to the maximum thirty-minute demand of the customer, at a power factor of eighty-five percent lagging. Except in multi-occupancy business premises where each business shall be serviced as an individual customer. Nothing in this rate shall be deemed to preclude a residential

occupancy on the customer's property from being served as a separate customer on a residential rate.

2. Measurement of Demand and Kilowatt-hours Supplied. Where two or more metering installations are provided on the customer's premises, the demand in any thirty-minute period shall be determined by adding together the separate demands at each metering installation during such thirty-minute period except that:

a. In case the demand at any metering installation is registered by an indicating or cumulative demand meter, the demand at such installation in each thirty-minute period of any month shall be assumed to be the same as the highest demand in any thirty-minute period of such month.

b. Where two or more metering installations are provided on the customer's premises and are for the same customer, and if one or more installations qualified for rate 5 and one or more installations qualified for rate 3 then the metering installation readings shall be combined and billed at rate 5.

3. The terms and conditions stated in Sections 13.08.010 through 13.08.210 apply to this rate and service hereunder shall be subject thereto.

(Ord. 2002-M-29 § 2; Ord. 2001-M-30 § 2; Ord. 2000-M-69 § 2; Ord. 1999-M-47 § 1.)

13.08.260 Rate 5 - General service - Rates, Charges, and Service Requirements.

A. Availability. Electrical energy is available under the General Service rate to any customer using the city's electric service for all requirements other than residential service.

B. Charges for this rate shall be as follows:

1. Monthly Customer Charge. The net monthly customer charge shall be twenty-seven dollars and eighty-five cents (\$27.85) per meter.

2. Demand Charge. The net demand charge shall be as follows:

\$13.09 per kilowatt - Summer Months

\$ 9.46 per kilowatt - Non-summer Months

For the purposes hereof the "summer months" shall be the customer's first monthly billing period with an ending meter reading date on or after June 15 and the three succeeding monthly billing periods.

3. Energy Charge. The energy charge shall be as follows:

\$.030 per kilowatthour for all kilowatthours

4. Minimum Charge. The minimum net monthly charge shall be the net monthly customer charge.

5. Gross Charge. The gross charge shall be ten percent more than the sum of the net customer charge, the net demand and the net energy charge for the billing period.

C. General Requirements.

1. The customer's wiring shall be so arranged that all service hereunder may be supplied through a single metering installation adequate for a normal load equal to the maximum thirty-minute demand of the customer, at a power factor of eighty-five percent lagging. Except in multi-occupancy business premises where each business shall be serviced as an individual customer. Nothing in this rate shall be deemed to preclude a residential occupancy on the customer's property from being served as a separate customer on a residential rate.

2. Measurement of Demand and Kilowatthours Supplied. Where two or more metering installations are provided on the customer's premises, the demand in any thirty-minute period shall be determined by adding together the separate demands at each metering installation during such thirty-minute period except that:

In case the demand at any metering installation is registered by an indicating or cumulative demand meter, the demand at such installation in each thirty-minute period of any month shall be assumed to be the same as the highest demand in any thirty-minute period of the month.

Where two or more metering installations are provided on the customer's premises and are for the same customer, and if one or more installation qualifies for rate 5 and one or more installations qualifies for rate 7 then the metering installation readings shall be combined and billed at rate 7.

3. The terms and conditions stated in Sections 13.08.010 through 13.08.210 apply to this rate and service hereunder shall be subject thereto.

(Ord. 2002-M-29 § 3; Ord. 2001-M-30 § 3; Ord. 2000-M-69 § 3; Ord. 1996-M-77 § 1; Ord. 1995-M-23 § 1; Ord. 1991-M-19 § 1; Ord. 1990-M-46 § 1; Ord. 1989-M-56 § 1; 1988-M-20 § 1; Ord. 1986-M-82 § 1; Ord. 1983-M-48 § 1 (part); Ord. 1982-M-15 § 1 (part); Ord. 1979-M-31 § 1 (part); Ord. 1977-M-40 § 1 (part); Ord. 1977-M-14 (part); Ord. 1975-M-38 (part); Ord. 1975-M-25 (part); prior code 14.104(E).

13.08.275 Rate 7 - Large General Service - Rates, Charges and Service Requirements.

A. Availability.

1. Electrical energy is available under the Large General Service rate to any customer using the city's electric system for all requirements other than residential service where such customer has a monthly peak kilowatt demand of at least 450 kilowatts during the billing period. Any customer on this rate whose monthly peak demand has not exceeded 450 kilowatts in the preceding twelve billing periods will be billed at the rate described in Section 13.08.260.

B. Charges for this rate shall be as follows:

1. Monthly Customer Charge. The net monthly customer charge shall be one hundred eleven dollars and thirty-eight cents (\$111.38) per meter.

2. Demand Charge. The net demand charge shall be as follows:

\$13.09 per kilowatt - Summer Months
\$ 9.46 per kilowatt - Non-Summer Months

For the purposes hereof the "summer months" shall be the customer's first monthly billing period with an ending meter reading date on or after June 15 and the three succeeding monthly billing periods.

3. Energy Charge. The net energy charge shall be as follows:

\$.034 per kilowatt-hour - On-Peak
\$.024 per kilowatt-hour - Off-Peak

4. The definition of On-Peak and Off-Peak Periods:

Energy On-Peak Periods, for purposes hereof, shall be the hours of 9:00 a.m. to 10:00 p.m. on Monday through Friday, except on days on which the following holidays are generally observed: New Year's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day, Christmas Day and, if one of the foregoing holidays occurs on a Tuesday or Thursday, the immediately preceding Monday or immediately following Friday, respectively. Energy Off-Peak Periods shall be all other hours.

Demand Peak Periods, for purposes hereof, shall be the hours, 9:00 a.m. to 10:00 p.m. on Monday through Friday, except the holidays designated above. Demand Off-Peak Periods shall be all other hours.

5. Minimum Charge. The net minimum monthly charge shall be the net monthly customer charge.

6. Gross Charge. The gross charge shall be ten percent more than the sum of the net customer charge, net demand charge and net energy charge.

7. The terms and conditions stated in Sections 13.08.010 through 13.08.210 apply to this rate and service hereunder shall be subject thereto.

C. General Requirements:

1. The customer's wiring shall be so arranged that all service hereunder may be supplied through a single metering installation adequate for a normal load equal to the maximum thirty-minute demand of the customer, at a power factor of eighty-five percent lagging. Except in multi-occupancy business premises where each business shall be serviced as an individual customer. Nothing in this rate shall be deemed to preclude a residential occupancy on the customer's property from being served as a separate customer on a residential rate.

2. Measurement of Demand and Kilowatthours Supplied. Where two or more metering installations are provided on the customer's premises, the demand in any thirty-minute period shall be determined by adding together the separate demands at each metering installation during such thirty-minute period except that:

In case the demand at any metering installation is registered by an indicating or cumulative demand meter, the demand at such installation in each thirty-minute period of any month shall be assumed to be the same as the highest demand in any thirty-minute period of such month.

Where two or more metering installations are provided on the customer's premises and are for the same customer, and if one or more installations qualified for rate 5 one or more installations qualified for rate 7, then the metering installation readings shall be combined and billed at rate 7.

3. The terms and conditions stated in Sections 13.08.010 through 13.08.210 apply to this rate and service hereunder shall be subject thereto.

(Ord. 2002-M-29 § 4; Ord. 2001-M-30 § 4; Ord. 2000-M-69 § 4; Ord. 1996-M-77 § 1; Ord. 1995-M-41 § 1; Ord. 1995-M-23 § 1; Ord. 1991-M-19 § 1; Ord. 1990-M-46 § 1; Ord. 1989-M-56 § 1; 1988-M-20 § 1; 1986-M-82 2 § 1.)

13.08.290 Rate 8 - Municipal Owned Street Lighting and Traffic Signals

A. Availability. This rate is available only to city of St. Charles owned and maintained street lights and traffic signals.

B. Charges for this rate shall be as follows:

1. Energy Charge.

\$.049 per kilowatthour for all kilowatthours

(Ord. 1997-M-20 § 1; Ord. 1997-M-9 § 1; Ord. 1996-M-77 § 1; Ord. 1995-M-23 § 1; Ord. 1994-M-25 § 1.)

13.08.300 Temporary Customer Connection (TCC)

A. A TEMPORARY CUSTOMER CONNECTION, as defined in Section 13.08.015 (L) will be provided for a CUSTOMER upon application and payment of a TEMPORARY CUSTOMER CONNECTION CHARGE (TCCC) as established by SCMEU on a case by case, IN PLACE COST basis.

B. TEMPORARY CUSTOMER CONNECTIONS for casual uses shall be limited to a maximum of twenty-one (21) days each calendar year for any event, function, or property.

(Ord. 1994-M-65 § 1; Ord. 1993-M-25 § 2; Ord. 1991-M-62 § 1; Ord. 1974-M-10: prior code § 14.104(I).)

13.08.305 Temporary electric service - Deposit.

Deposit shall be charged to any customer at any time such customer makes formal application at the finance office for temporary electric service. The amount shall be equal to the city's most recent cost for the meter or a minimum of \$50. (Ord. 1993-M-25 § 2.)

ROADWAY STREET LIGHT INSTALLATION

POLE:

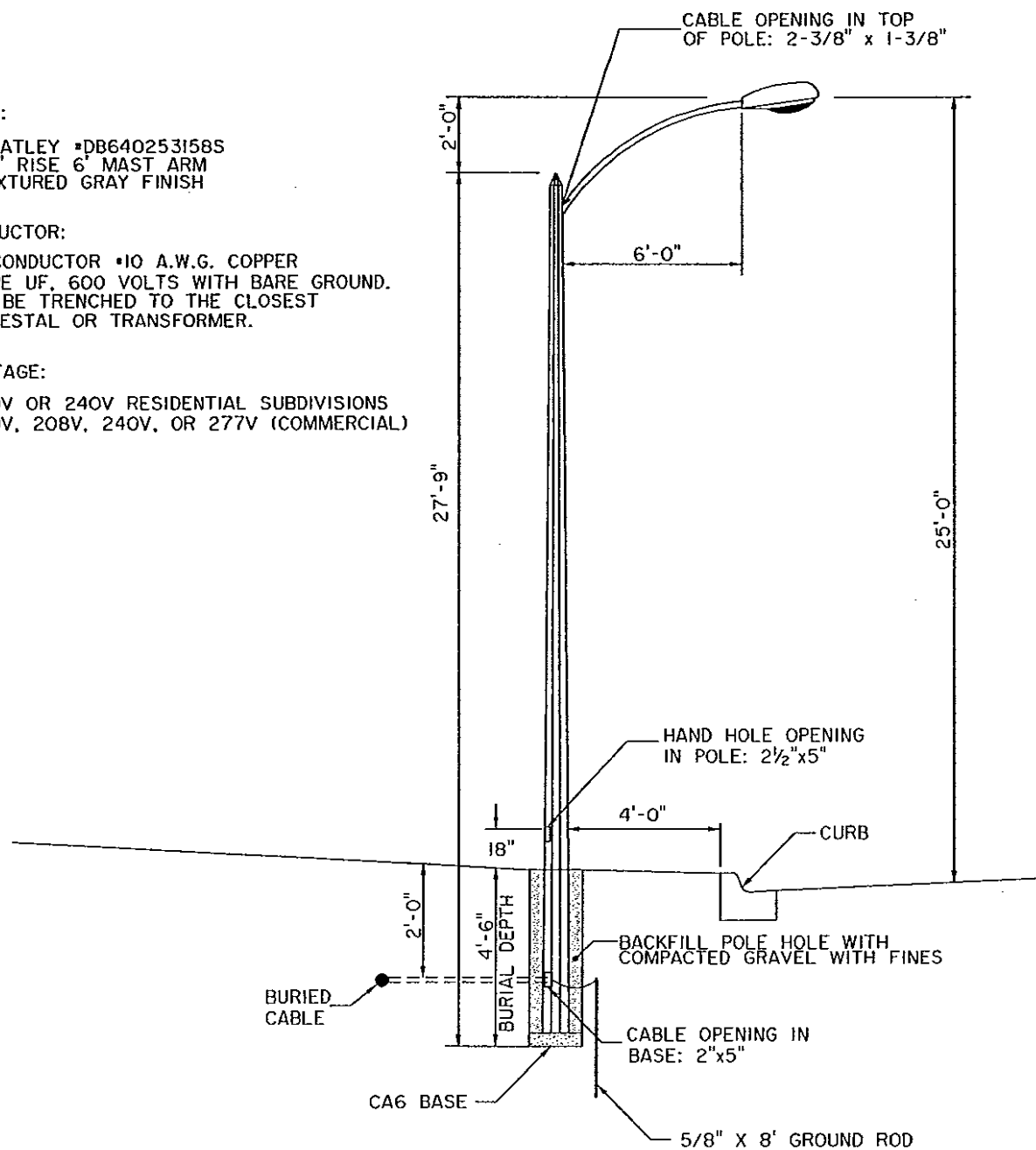
WHATLEY *DB640253158S
24" RISE 6' MAST ARM
TEXTURED GRAY FINISH

CONDUCTOR:

2 CONDUCTOR *10 A.W.G. COPPER
TYPE UF, 600 VOLTS WITH BARE GROUND.
TO BE TRENCHED TO THE CLOSEST
PEDESTAL OR TRANSFORMER.

VOLTAGE:

120V OR 240V RESIDENTIAL SUBDIVISIONS
120V, 208V, 240V, OR 277V (COMMERCIAL)



CITY OF ST. CHARLES

DECORATIVE STREET LIGHT STANDARD

KEY:

- (A) CABLE OPENING IN
BASE = 2" X 12"
- (B) HAND HOLE OPENING
IN POLE = 3" X 4 1/4 X 7"
- (C) PHOTO ELECTRIC
CELL RECEPTACLE
- (D) 5/8" X 8' GROUND ROD
- (E) TWO PIECE FIBERGLASS
BASE COVER

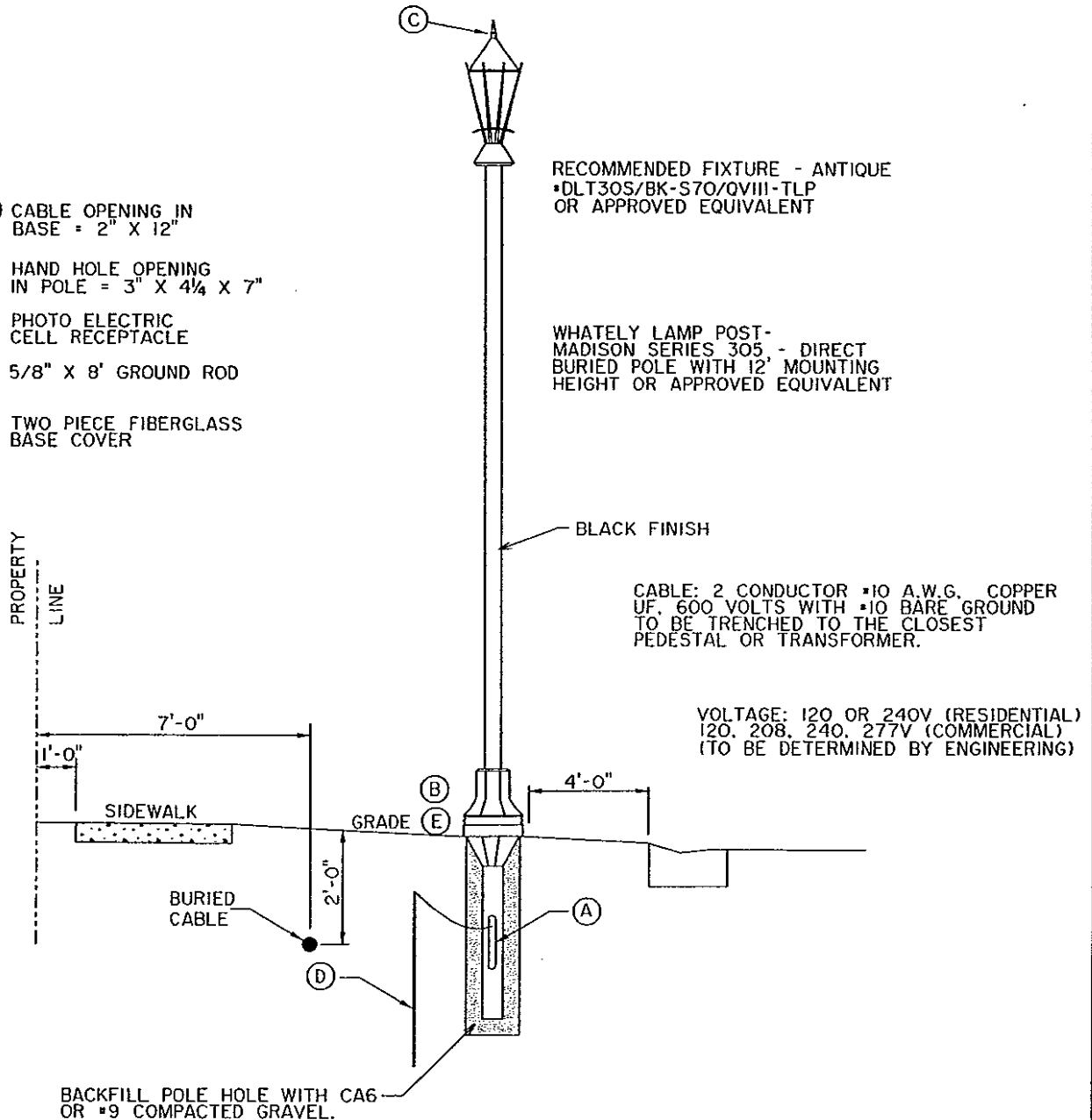
RECOMMENDED FIXTURE - ANTIQUE
•DLT305/BK-S70/QVIII-TLP
OR APPROVED EQUIVALENT

WHATELY LAMP POST-
MADISON SERIES 305 - DIRECT
BURIED POLE WITH 12' MOUNTING
HEIGHT OR APPROVED EQUIVALENT

BLACK FINISH

CABLE: 2 CONDUCTOR #10 A.W.G. COPPER
UF, 600 VOLTS WITH #10 BARE GROUND
TO BE TRENCHED TO THE CLOSEST
PEDESTAL OR TRANSFORMER.

VOLTAGE: 120 OR 240V (RESIDENTIAL)
120, 208, 240, 277V (COMMERCIAL)
(TO BE DETERMINED BY ENGINEERING)



CITY OF ST. CHARLES

X. Horizontal Workspace Requirements

Clear and level work areas are required around pad mounted equipment to provide an adequate safe working space to operate and maintain the equipment. Sufficient clearance to remove covers, operate with hot sticks, replace equipment and cable, etc. is required.

The required workspaces for safe clearances are as follows:

- a. 8 feet minimum in front of all equipment doors to provide room to operate with hot sticks and to replace the equipment (The front is identified by a sticker and padlock).
- b. 3 feet minimum from non-operable sides to provide room to replace the equipment.

These clearances apply to all types of obstructions including, but not limited to, landscaping and fences.